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NOTICE OF ALLOWANCE AND FEE(S) DUE

26263 7590 07/10/2008

CHICAGO, IL 60606-1080

SONNENSCHEIN NATH & ROSENTHAL LLP P.O. BOX 061080 WACKER DRIVE STATION, SEARS TOWER EXAMINER BAYAT, ALI

PAPER NUMBER

2624
DATE MAILED: 07/10/2008

APPLICATION NO. FILNO DATE HIST NAMED INVENTOR ATTORNEY DOCKET NO. CONFERMATION NO. 10/518.607 12/23/2004 Yumi Kato 09792909-6661 9032

TITLE OF INVENTION: IMAGE PROCESSING DEVICE AND IMAGE PROCESSING METHOD

APPLN, TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	NO	\$1440	\$300	\$0	\$1740	10/10/2008

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION NO THE MERITS IS CLOSED. THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED. SEE 35 U.S.C. 151. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

HOW TO REPLY TO THIS NOTICE:

I. Review the SMALL ENTITY status shown above.

If the SMALL ENTITY is shown as YES, verify your current SMALL ENTITY status:

A. If the status is the same, pay the TOTAL FEE(S) DUE shown above.

B. If the status above is to be removed, check box 5b on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and twice the amount of the ISSUE FEE shown above, or

If the SMALL ENTITY is shown as NO:

A. Pay TOTAL FEE(S) DUE shown above, or

B. If applicant claimed SMALL ENTITY status before, or is now claiming SMALL ENTITY status, check box 5a on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and I/2 the ISSUE FEE shown above.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail Commissioner for Patents P.O. Box 1450 Alexandria, Virginia 22313-1450

or Fax (571)-273-2885

appropriate. All further indicated unless corrects maintenance fee notifica	correspondence includir ed below or directed oth	or transmitting the 1880 ig the Patent, advance of nerwise in Block 1, by (a	rders and notification of n a) specifying a new corres	naintenance fees wil pondence address; a	ll be mailed to the current and/or (b) indicating a sep	arate "FEE ADDRESS" fo	
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P.O. BOX 06108 WACKER DRI	VE STATION, SEA	SENTHAL LLP	7 6	Certi	ficate of Mailing or Trans		
CHICAGO, IL 6	00606-1080					(Depositor's name)	
						(Signature)	
						(Date)	
APPLICATION NO.	FILING DATE		FIRST NAMED INVENTOR		ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/518,607	12/23/2004		Yumi Kato		09792909-6061	9032	
			PROCESSING METHOD			1	
APPLN, TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE			
nonprovisional	NO	\$1440	\$300	\$0	\$1740	10/10/2008	
EXAM	INER	ART UNIT	CLASS-SUBCLASS	J			
BAYA	T, ALI	2624	382-260000				
1. Change of correspondence address or indication of "Fee Address" (37 CFR 1.563). Change of correspondence address for Change of Correspondence Address for PICOSB 1/22) and Lanched. "Tee Address" indication for "Fee Address" Indication form PTOSB4/12 June 20 cr more recent) attached. Use of a Customer Number is required.			or agents OR, alternative (2) the name of a single registered attorney or a 2 registered patent attornisted, no name will be	he names of up to 3 registered patent attorneys I genes OR, alternatively, he name of a single firm (having as a member a 2 settered attorney or agents) and the names of up to gistered patent attorneys or agents. If no name is 3, no name will be printed.			
PLEASE NOTE: Uni recordation as set fort (A) NAME OF ASSI	less an assignee is ident h in 37 CFR 3.11. Comp GNEE	ified below, no assignee pletion of this form is NO	(B) RESIDENCE: (CITY	atent. If an assigned assignment. and STATE OR CO	OUNTRY)	document has been filed for	
Please check the appropr	iate assignee category or	categories (will not be pr	inted on the patent):	Individual	poration or other private gr	oup entity Government	
4a. The following fee(s) Issue Fee Publication Fee (N	o small entity discount p		A check is enclosed. Payment by credit can	d. Form PTO-2038		shown above) eficiency, or credit any un extra copy of this form).	
	s SMALL ENTITY state	as. See 37 CFR 1.27.	b. Applicant is no long	ger claiming SMALI	ENTITY status. Sec 37 C	FR 1.27(g)(2).	
NOTE: The Issue Fee an interest as shown by the	d Publication Fee (if req records of the United Sta	uired) will not be accepted tes Patent and Trademark	d from anyone other than the office.	he applicant; a regist	ered attorney or agent; or t	he assignee or other party ir	
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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/518,607	12/23/2004	Yumi Kato	09792909-6061	9032	
26263 7	590 07/10/2008		EXAM	UNER	
SONNENSCHEIN NATH & ROSENTHAL LLP			BAYAT, ALI		
P.O. BOX 061080			ART UNIT	PAPER NUMBER	
WACKER DRIVE STATION, SEARS TOWER CHICAGO, IL 60606-1080			2624 DATE MAIL ED: 07/10/200	8	

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b)

(application filed on or after May 29, 2000)

The Patent Term Adjustment to date is 803 day(s). If the issue fee is paid on the date that is three months after the mailing date of this notice and the patent issues on the Tuesday before the date that is 28 weeks (six and a half months) after the mailing date of this notice, the Patent Term Adjustment will be 803 day(s).

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (http://pair.uspto.gov).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 or (571)-272-4200.

Notice of Allowability

Application No.	Applicant(s)	
10/518,607	KATO ET AL.	
Examiner	Art Unit	
ΔΙΙΒΑΥΔΤ	2624	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address-All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS. This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.33 and MPEP 1308.

- This communication is responsive to 5/28/08.
- 2. The allowed claim(s) is/are 1-7 and 11-19(renumbered as 1-16).
- 3. Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a)

 All b)

 Some* c)

 None of the:
 - 1. A Certified copies of the priority documents have been received.
 - 2. Certified copies of the priority documents have been received in Application No. ____
 - Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).
 - * Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDOMMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

- 4. A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
- 5. CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) Thereto or 2) to Paper No./Mail Date
 - (b) including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).

6. DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

- 1. Notice of References Cited (PTO-892)
- 2.
 Notice of Draftperson's Patent Drawing Review (PTO-948)
- 3. Information Disclosure Statements (PTO/SB/08),
- Paper No./Mail Date 12/23/04
- Examiner's Comment Regarding Requirement for Deposit of Biological Material
- 5. Notice of Informal Patent Application
- Interview Summary (PTO-413), Paper No./Mail Date .
- 7. Examiner's Amendment/Comment
- 8. X Examiner's Statement of Reasons for Allowance
- 9. Other _____.

Application/Control Number: 10/518,607 Page 2

Art Unit: 2624

Response to Election/Restriction

Applicant's response filed on 5/28/08 has been acknowledged, Applicant
has elected the species of Figure 6 without traverse for examination, which
corresponds to claims 1-7 and 11-19, therefore claims 1-7 and 11-19 will be
examined.

EXAMINER'S AMENDMENT

An examiner's amendment to the record appears below. Should the
changes and/or additions be unacceptable to applicant, an amendment may be
filed as provided by 37 CFR 1.312. To ensure consideration of such an
amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with David R. Metzger on 6/23/08.

The application has been amended as follows:

In line 4 page 6 of specification after "a" delete forth and insert –fourth--, also in line 5 page 6 of specification after "by the" delete fourth and insert—third--.

Please substitute the original abstract with the following new abstract.

Art Unit: 2624

ABSTRACT

Distribution data is generated by a distribution data generation portion, a second range is specified by a specifying portion, the second range is mapped to a first range by a mapping portion, and third image data is generated by performing binarization based on a threshold value regulated in the first range by components, binarization can be suitably performed even in the case where distribution data of pixel values differs for each subject.

Art Unit: 2624

Please cancel claims 8-10 and 20-25.

In claim 1, line 5, after "in" delete "the" and insert - a -.

In claim 11, line 5, beginning of the line delete "the" and insert - a -

In claim 11, line 14, delete "a forth" and insert - a fourth -,

In claim 11, line 15, delete "the fourth" and insert - the third -.

In claim 12, line 1, delete "set fourth" and insert - set forth -.

In claim 13, line 3, beginning of the line delete "forth "and insert - fourth-.

In claim 14, line 2, delete "claim 15" and insert - claim 13 -.

In claim 17, line 6, delete "the forth" and insert - the fourth -.

In claim 18, line 9, delete "the forth" and insert - the fourth -.

In claim 19, line 2, delete "sixth image" and insert - fifth image -.

Allowed claims

Claims 1-7 and 11-19 (renumbered as 1-16).

Reasons for Allowance

4. The following is an examiner's statement of reasons for allowance: the closest prior art of Spangler (US 7,130,463) relates to the field of photography and more specifically to a method and apparatus for analyzing captured digital images see field of invention. Further in col.2 lines 49-51 teaches zooming the digital image includes mapping a second number of stored pixels of the stored

digital image to the displayed pixels, where the second number of stored pixels is less than the first number of stored pixels.

Spangler failed to teach or suggest for a mapping means for mapping pixel data in the second range specified by the specifying means among a plurality of pixel data to the first range, and generates second image data composed of the mapped pixel data; a binarization means for binarizing the second image data generated by the mapping means based on a threshold value regulated in the first range to generate a third image data. As cited in claims 1 and 11.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Contact Information

 Any inquiry concerning this communication or earlier communications from the examiner should be directed to ALI BAYAT whose telephone number is (571)272-7444. The examiner can normally be reached on M-F 9:00 AM-5:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Matthew Bella can be reached on 571-272-7778. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2624

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Matthew C Bella/ Supervisory Patent Examiner, Art Unit 2624

Ali Bayat Patent Examiner Division 2624 6/23/08